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FEDERAL BUREAU OF INVESTIGATION

Date of transcription 04/01/2005b6
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On March 31, 2005, BRUCE EDWARDS IVINS, PhD, date of birth April 22, 1946, Social Security Account Number [REDACTED] was interviewed by Supervisory Special Agent (SSA) [REDACTED] and Inspector [REDACTED] of the Federal Bureau of Investigation (FBI). The interview was conducted at IVINS' place of employment, the United States Army Medical Research Institute of Infectious Diseases (USAMRIID) at Fort Detrick, Maryland. IVINS' office telephone number is [REDACTED]

IVINS is employed as a Research Microbiologist in the Bacteriology Division of USAMRIID and was so employed at the time of the fall 2001 anthrax attacks. IVINS has been interviewed numerous times throughout the course of the AMERITHRAX investigation. The purpose of the interview was to elicit additional details concerning specific topics of heightened relevance to the investigation.

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Prior to the commencement of the interview on March 31, 2005, IVINS was presented with a Non-Disclosure Agreement which he reviewed and signed. IVINS' signing of the form was witnessed by the interviewing Agents as memorialized on the form. The Non-Disclosure Agreement is filed in the 1A section of the file along with the notes of the interviewing Agents and documents shown to Ivins during the interview.

IVINS' Collection of Environmental Samples at USAMRIID

ADMINISTRATIVE: Ivins was questioned regarding information he previously provided during an interview on April 24-25, 2002, concerning his unilateral decision to collect environmental samples (swabs) from his USAMRIID office work space and other areas in December 2001 and April 2002. The results of this prior interview are memorialized in an FD-302 which is serialized at 279A-WF-222936-302 Serial 1700.

IVINS explained that in December 2001, he shared an office (Room [REDACTED] Building 1425) with [REDACTED]. During this time period, IVINS and [REDACTED] worked in the [REDACTED] Division. [REDACTED] also worked in the [REDACTED] Division but was [REDACTED]. The purpose [REDACTED]

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b7CInvestigation on 03/31/2005 at Ft. Detrick, MarylandFile # 279A-WF-222936-USAMRIID-1223Date dictated 04/01/2005by SSA [REDACTED]
Inspector [REDACTED]

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b6 of [] was to assist [] with the increased workload in
b7C that division occasioned by the fall 2001 anthrax attacks.

By way of background, Ivins related that in October 2001, the Daschle letter was initially weighed in Room [] and then processed and photographed in Rooms []. These rooms are part of the Special Pathogens Branch of DSD and are biosafety level two (BSL-2) facilities. All three rooms are located in Building 1425. Following the initial processing of the Daschle letter, IVINS was tasked by [] to assess the concentration of the anthrax powder in the Daschle envelope. To perform a colony count, IVINS took the Daschle letter to Room [] in Suite B3.

IVINS identified two reasons for his decision to swab his office space in December 2001. First, IVINS did not believe that the Daschle letter should have been processed in Room [] and [] because the biosafety level category (i.e., BSL-2) was not adequate to contain aerosolizable anthrax powder. Consequently, he was concerned that some anthrax may have escaped the confines of these two rooms. Second, IVINS advised that [] commented "daily" to him during [] that [] employee lab practices were unsafe. [] complained about this "many times," he said. Based on [] claims, IVINS feared that [] inadvertently may have contaminated the office []. Accordingly, IVINS decided to collect environmental samples from [] desk, chair, telephone and computer. IVINS did not swab his own work area (i.e., desk, chair, computer) or that of [] even though they all shared the same room. IVINS collected approximately 20 individual swabs from [] work area.

b6 When queried as to why he swabbed only []
b7C workspace, IVINS said his decision was predicated on the layer of dust he observed on [] desk and the fact that [] was the only one [] who had been working [] where lab safety procedures were believed to be substandard. IVINS also offered that the air flow of the heating/ventilating/air conditioning (HVAC) system in the room placed his desk and [] desk "upwind" from [] desk so that he did not expect any errant anthrax spores to have settled on his or [] desk.

IVINS advised that his culturing of the environmental samples from [] produced "a few presumptives" - i.e., colonies that visually appeared to be *Bacillus anthracis*.

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Specifically, about one-half of the twenty samples he collected appeared to generate anthrax colonies when cultured. IVINS did not subject these "presumptive" positives to any confirmatory analysis. In response to these presumptive positives, IVINS said he cleaned up [redacted] desk and left it at that. He took no further actions to decontaminate the room. When questioned as to why he took no remedial measures beyond cleaning up [redacted] desk, IVINS advised that he did not consider the level of contamination indicated by his sampling to be significant, stating that he did not find "hundreds or thousands" of spores but only a "few presumptives." IVINS said he did not believe a full decontamination of the room was warranted based on his findings, and he did not perceive himself or his office mates to be in any danger.

IVINS confirmed that he did not tell [redacted] about his swabbing of [redacted] workspace nor did he advise [redacted] of the presumptive positive results. IVINS did tell [redacted] about his findings. He did not suggest to either co-worker that antibiotic prophylaxis might be appropriate. IVINS again reiterated that based on the level of contamination he observed, he did not perceive himself or his coworkers to be at risk.

IVINS confirmed that he undertook the collection of environmental samples from his office space on his own initiative and without any prior authorization from superiors. When queried as to why he did not seek permission to swab or voice his concerns about the possible contamination to USAMRIID's [redacted] or others, IVINS predicted that [redacted] would have been dismissive of his concerns and would have told him to "forget about it." IVINS related that [redacted] angry reaction when [redacted] learned of IVINS' environmental sampling confirmed IVINS' suspicions that [redacted] would be opposed to such swabbing. IVINS opined that despite his outward response, [redacted] inwardly seemed "sort of pleased" with IVINS' finding of contamination because it allowed [redacted] to "point a finger" at [redacted] for poor laboratory safety procedures.

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IVINS also re-emphasized that there was a longstanding political rivalry between DSD and the Bacteriology Division. According to IVINS, Bacteriology Division employees felt somewhat ostracized and belittled by DSD researchers who were reportedly loathe to consult Bacteriology employees concerning matters within Bacteriology employees' superior expertise. The path IVINS chose to swab was the path that the Daschle letter took from [redacted] to and through the pass-box in the wall of suite B3. IVINS believed

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any contamination would most likely have occurred along the same path the letter took. IVINS also reported that he had no concerns about [] competency as a [] and his decision to swab [] work area was not influenced by any perception that [] was negligent in [] safety practices.

IVINS was also questioned concerning information he previously provided during an interview on April 24-25, 2002, concerning his unilateral decision to collect environmental samples (swabs) from areas associated with Suite B3 in Building 1425 in April 2002. IVINS advised that he made the decision to unilaterally swab areas associated with Suite B3 when he learned that USAMRIID researcher [] had recently conducted an environmental sampling of the B3 lab which produced several presumptive positives for *Bacillus anthracis*. [] reportedly undertook this sampling effort in response to a suspected spill which occurred during an experiment being conducted by researchers []. As a precautionary measure, nasal swabs were taken from []

[] In addition to the possible spill and [] nasal swab, IVINS also recalled that Suite B3 is where he had conducted plating and colony counts on the Daschle letter. Consequently, he suspected that stray spores may have aerosolized during that effort.

IVINS advised that the December 2001 and April 2002 environmental samplings represent the only two times he has ever swabbed in the cold areas of USAMRIID outside of the hot suites. IVINS related that during the early 1990s he performed a lot of swabbing inside the hot suites as part of USAMRIID's routine environmental monitoring program. He conducted this sampling at the direction of his superiors. These samples were collected as a routine safety precaution and, unlike his December 2001 and April 2002 collections, were not performed in response to a specific concern or suspected contamination. IVINS has since been excluded from the task of any such monitoring.

IVINS reported that no isolates related to his December 2001 or April 2002 swabbing initiatives remain in existence. IVINS said he threw them away after obtaining the presumptive positive results.

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Continuation of FD-302 of Bruce Edwards Ivins, On 03/31/2005, Page 5IVINS' Knowledge of Reported Proposals to Start Conducting Animal Challenges at USAMRIID with Dried Ames Anthrax Powder

ADMINISTRATIVE: In an interview of another USAMRIID employee on February 15, 2005 (279A-WF-222936-USAMRIID serial 1103), it was reported that certain employees at USAMRIID were considering a proposal to begin using dried Ames anthrax powder for animal challenges. IVINS was questioned by the interviewing Agents concerning his knowledge of this proposal and any discussions related thereto.

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IVINS said he was not aware of any planning meetings or discussions concerning any proposal to switch from using anthrax in a liquid slurry form to a dried powdered form for animal challenges. IVINS related that to the best of his knowledge, such a switch would have been contrary to USAMRIID policy. IVINS explained that [REDACTED] had distributed a letter to all researchers immediately after the fall 2001 anthrax attacks stating that no powder versions of any select agent were to be made without his express permission. IVINS believed this was also a directive of the Fort Detrick commanding General. IVINS knew of no one at USAMRIID who has produced dried anthrax after the fall 2001 attacks. IVINS said he would be surprised to learn that such a proposal had actually been broached. As an aside, he claimed that he gets "really pissed off" by scientists who want to make anything that could be used to kill or make people sick.

IVINS likewise advised that he had no first-hand personal knowledge of anyone producing dried anthrax powder prior to the fall 2001 attacks. However, IVINS said he recently became aware that [REDACTED] had produced dried irradiated anthrax spores for a project with [REDACTED]. IVINS said he learned this by reading a USAMRIID response to a FOIA request. IVINS believed that the dried product produced by [REDACTED] was first irradiated as a liquid slurry before being dried.

IVINS further related that USAMRIID [REDACTED] [REDACTED] once brought IVINS a "national security sample" of what was believed to be powdered *Bacillus anthracis* which he asked IVINS to culture and test. The powdered sample was given to IVINS in a vial labeled either "IA" or "I1." [REDACTED] represented to IVINS that this suspected anthrax sample had come from Iraq. IVINS said that this particular sample was catalogued at USAMRIID as a "diagnostic agent" to avoid labeling it as *Bacillus anthracis*.

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IVINS advised that this was the only instance he is aware of in which the true identity of a select agent was concealed by labeling it as a diagnostic agent. IVINS said he is not aware of any other intentional mislabelings. IVINS believed he still has some of the Iraqi sample in his possession and agreed to provide the FBI with a sample of it.

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IVINS further offered that [] once told him that

[] IVINS said he heard that when MIKESELL died, his office was tested for the presence of anthrax.

Missing 2001 E-Mail Archive on IVINS' USAMRIID Computer

ADMINISTRATIVE: On January 13, 2005, the hard drive of IVINS' assigned USAMRIID computer was copied by the FBI with his consent. A review of the hard drive copy revealed that e-mails for the year 2001 appeared to be missing from the hard drive, although e-mail archives for prior and subsequent years were located. IVINS was asked by interviewing Agents to explain the reason for this omission.

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IVINS advised that he was very surprised by the interviewing Agents' claim that his 2001 e-mails were missing from his hard drive. IVINS said he archives e-mails by subject, not by date, however, he believes e-mails from this time period should be on his computer. As he had mentioned in a previous interview, IVINS stated that he is not sure whether his e-mail archives to his hard drive or to USAMRIID's server. IVINS said that if his 2001 e-mails are on the USAMRIID server rather than his hard drive, he would allow the FBI to make a copy of them. IVINS insisted that he did not delete any batches of e-mail from his computer pertaining to the year 2001. He agreed to allow SA [] and an FBI Computer Analysis Response Team (CART) agent copy any e-mails he had archived on the server. This operation, documented separately, was arranged at the end of this interview and took place the same day, shortly after the interview.

IVINS' Knowledge of the Use of Fermenters to Grow Anthrax

IVINS advised that he has seen the anthrax powders from the fall 2001 attacks because the recovered powders from the envelopes were processed at USAMRIID and IVINS plated the powder to obtain colony counts. IVINS advised that he would assign the

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following letter grades to the anthrax powders based on their quality and apparent degree of refinement: Daschle powder - "A"; Leahy powder - "B"; and Post powder - "C". The Post powder, "didn't look so hot," he added.

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IVINS elaborated on a comment made in a prior interview that the Daschle anthrax powder appeared to him to have been fermenter-grown. IVINS based this judgment on his observation that broth-grown spores (fermentation method) are always cleaner than agar-grown spores. IVINS noted that when he saw the anthrax powder from the Daschle envelope, he immediately thought to himself, "fermenter-grown." IVINS said he concomitantly suspected USAMRIID scientist [redacted] because [redacted]

[redacted] IVINS said [redacted] never asked IVINS for any Ames spores and IVINS never gave [redacted] any Ames spores. IVINS also reported that [redacted]

[redacted]
In addition, IVINS noted that [redacted] "fit all the check marks" - which IVINS explained meant that [redacted] exhibited the characteristics outlined in the FBI's published behavioral profile of the anthrax mailer. IVINS observed that [redacted]

[redacted]
IVINS related that while USAMRIID had fermenters, to his knowledge they were never used to grow any virulent select agents, including *Bacillus anthracis*. The fermenters were used only to grow non-virulent bacteria, such as *Bacillus subtilis*. IVINS believes that [redacted]

[redacted] IVINS did not recall anyone else using the fermenters [redacted] In addition, USAMRIID acquired some new fermenters after the fall 2001 anthrax attacks, however, IVINS does not recall them ever being placed into service or anyone using them.

IVINS did not recall any specific discussions about creating a fermenter room at USAMRIID for the purpose of growing anthrax spores. He speculated that such discussions may have occurred, and if they did, they concerned dedicating a room for the fermentation growth of anthrax spores in flasks, not a fermenter. He explained that using a multi-gallon fermenter for this purpose would have been out of the question due to the potentially catastrophic results of an accidental spill of such a large quantity of anthrax. IVINS believed it would be simply too

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dangerous to produce virulent anthrax in a metropolitan area using a fermenter because of the large quantity yielded.

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[REDACTED]

ADMINISTRATIVE: On February 15, 2002, [REDACTED]

[REDACTED]

[REDACTED]

[REDACTED] IVINS submitted to the FBI certain isolates of Ames strain *Bacillus anthracis* which were in his possession and under his control. However, he did not submit all Ames strain isolates in his possession. Some of the samples he omitted from his [REDACTED] response were subsequently recovered by the FBI during a consent search of freezers in IVINS' lab. Some of these omitted samples exhibit the same genetic attributes as the anthrax used in the attacks. The interviewing Agents questioned IVINS concerning these omissions.

IVINS explained [REDACTED] by the FBI to USAMRIID for Ames anthrax. IVINS said that he believed the FBI wanted all Ames "stocks, cultures and sub-cultures" but not every derivative isolate. IVINS related that if an Ames isolate was not considered part of USAMRIID's currently utilized inventory, he assumed the FBI was not interested in it and did not produce it. For example, Ames isolates abandoned at the facility by scientists who had left the employment of USAMRIID were not considered responsive [REDACTED] if those isolates were believed to have been derived from an identifiable stock and a sample of that stock had been submitted to the FBI. IVINS also cited some Ames isolates dated 1985 which were not produced by him because USAMRIID was not utilizing them in research or studies and had no intention of doing so. IVINS said he made an effort to produce every Ames stock that USAMRIID was using or might use for research work.

[REDACTED]

[REDACTED]

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[REDACTED] IVINS offered that he would not deliberately destroy something he knew or thought to be evidence. IVINS added, "If I can't find something, I'll tell you everything I know about it."

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Upon being advised that the Ames *Bacillus anthracis* stock known as research material (RMR) 1029 shared genetic similarities with the Ames anthrax used in the attacks, IVINS indicated he was already aware of this. IVINS explained that many months to a year ago (circa 2002 or 2003), FBI Special Agent [REDACTED] told him "that the phenotypic variants from 1029 matched the evidence." IVINS confirmed that he was the custodian of RMR 1029 and advised he began receiving shipments of RMR 1029 from Dugway Proving Ground in 1997. IVINS related that RMR 1029 was comprised of six separate batches of Ames spores produced by Dugway Proving Ground and shipped to USAMRIID. A seventh batch was to have been included, but it was of such poor quality that IVINS designated it for autoclaving shortly after receiving it. IVINS advised that all six Dugway production lots were combined together to constitute RMR 1029; no portion of the six Dugway production lots was held back or used for another purpose. He retained no subsamples of pure Dugway spores, without the added USAMRIID-made spores, so anything labeled as Dugway spores in his laboratory included a portion of spores made at USAMRIID. IVINS said he sent samples of RMR 1029 to Battelle in Columbus, Ohio and also to [REDACTED] the University of New Mexico. IVINS reported that he is the only person who distributed RMR 1029 to other researchers. IVINS also said he had a list of all the people with whom he had shared RMR 1029 and that the FBI has a copy of this list. According to IVINS, this list contains only one omission which is [REDACTED]. IVINS related that other researchers asked him for some of RMR 1029 "all the time," however, he gave it to only those persons whose names are recorded on the list.

IVINS was adamant in his belief that a sample of RMR 1029 was submitted to the FBI [REDACTED]

[REDACTED] IVINS said it was a "real surprise" to learn from the interviewing Agents that [REDACTED]

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[REDACTED] flask. IVINS opined that the samples of [REDACTED] which he sent to [REDACTED] and the University of New Mexico should also exhibit the same genetic characteristics that [REDACTED] shares with the anthrax used in the attacks. Upon being advised by the interviewing Agents that [REDACTED] and the University of New Mexico's [REDACTED]

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isolates do not share those same genetic characteristics, IVINS said he did not understand why and that it did not make sense. IVINS indicated that he would locate his paperwork on the samples which were submitted to the FBI in response to the subpoena.

Reference Material Receipt Record Inconsistencies
Regarding Location of RMR 1029

ADMINISTRATIVE: IVINS was shown two copies of a page of his Reference Material Receipt Record for RMR 1029. One copy was of the original form maintained in IVINS' office and provided by him to agents in prior interviews. The other copy was an older version of the same form found in the laboratory notebook of [REDACTED] with certain information "whited out" (i.e., covered with white correction fluid) and new information written in on top of the "white out." Both pages are versions of a form labeled "U.S. Army Medical Research Institute of Infectious Diseases - Reference Material Receipt Record," dated October 22, 1997. The version of the form from [REDACTED] notebook indicates that RMR 1029 was stored in Room [REDACTED] of Building 1412. However, IVINS' version of the form with white out indicates this notation was changed at some point to indicate that RMR 1029 was stored in suite B3 of Building 1425. IVINS was questioned concerning his knowledge of the storage locations of RMR 1029 and the reason(s) for the changes recorded on the Receipt Record. Both pages shown to IVINS are included in a 1A envelope.

IVINS advised that the large flask of RMR 1029 was always stored in suite B3 of Building 1425. IVINS advised that the copy of the form indicating RMR 1029 was stored in room [REDACTED] of Building 1412 was wrong. "We never stored 1029 in the big flask in [REDACTED]" he said. IVINS advised that aliquots of RMR 1029 had been taken to room [REDACTED] in Building 1412 a number of times to be used for animal challenges. On each occasion, the RMR 1029 material needed for a challenge was decanted into a smaller glass bottle in suite B3 in building 1425 before being taken to room [REDACTED] in building 1412. The smaller bottle taken to room [REDACTED] sometimes contained a fully concentrated aliquot and sometimes a diluted aliquot. Once taken to room [REDACTED] the aliquot of RMR 1029 was stored in the sliding glass door refrigerator of Room [REDACTED] until the animal challenge commenced. After a challenge, the Ames material from the all-glass impingers (AGIs) was stored in the walk-in refrigerator on the first floor of building 1412.

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IVINS acknowledged that the handwriting on the two pages shown to him was his. IVINS had no present recollection of making a change to the page (i.e., whitening out the room location and changing it to suite B3). However, he speculated that he changed the form to reflect the location where the bulk stock (large flask) of RMR 1029 was actually stored - in suite B3.

ADMINISTRATIVE: IVINS' attention was again directed to the same two copies of the "Reference Material Receipt Record" and specifically to the section at the bottom of the form labeled "Reference Material Inventory". The form indicates that RMR 1029 was initially comprised of 1,000 milliliters of "highly purified Ames spores - 3×10^{10} ." The sixth entry on the Reference Material Inventory reflects that on February 22, 2000, six milliliters were taken from a remaining balance of 994 milliliters and used by/sent to "Covance." Following this transaction, the log should have reflected a remaining balance of 988 milliliters of RMR 1029 (i.e., $994\text{ml} - 6\text{ml} = 988\text{ml}$). Instead, the log reflects that 888 milliliters were remaining after this transaction - a difference of 100 milliliters. This mathematical error suggests that 100 milliliters of RMR 1029 is unaccounted for. The discrepancy had been discussed with IVINS in two prior interviews, but IVINS was questioned further for clarification concerning this entry.

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IVINS said that he never noticed this mathematical error until it was brought to his attention by SSA . Moreover, IVINS stated he never noticed any material missing from the RMR 1029 flask, explaining that if 100 milliliters is actually missing from the RMR 1029 flask, he does not know what happened to it. IVINS noted that the putative missing 100 milliliters of 1029 "now gives me pause," in light of the information conveyed to him today by the FBI concerning the genetic similarities between RMR 1029 and the anthrax used in the attacks.

RMR 1029 and Disposition of Seventh Batch of Dugway Spores

ADMINISTRATIVE: IVINS was next questioned regarding the background of RMR 1029 and the seventh of seven installments of Ames anthrax slurry received by USAMRIID from Dugway Proving Ground.

By way of background, IVINS reported that in 1997, he was working to come up with a second generation anthrax vaccine utilizing recombinant protective antigen (RPA). IVINS advised that the Pentagon had stopped this initiative in the mid-1990s, but had

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reinstitutioned it in 1997. It was the reinstitution of the RPA project which generated USAMRIID's need for a single lot of 1,000 milliliters of highly concentrated liquid Ames anthrax spores - the lot which ultimately became RMR 1029. These spores were needed for animal challenges to assess the efficacy of the newly developed vaccine. USAMRIID planned to use this large spore lot for all animal challenges. IVINS explained that it was important for purposes of continuity to have a single batch of Ames anthrax spores to serve as the challenge material for all experiments. Using one homogenous lot of challenge material would ensure the comparability of results across several animal challenge experiments. Because IVINS estimated it would have taken he and [REDACTED] approximately one to two years to produce 1,000 milliliters of concentrated spores using their standard flask fermentation method, USAMRIID contracted with Dugway Proving Ground which agreed to produce the spores in batches at Dugway Proving Ground using fermenters and then ship the batches as they were completed to USAMRIID for purification and use. IVINS said the contract called for Dugway to produce 1,000 milliliters of "useable spores" (i.e., 3×10^{13} total spores). IVINS also related that some smaller Ames spore preparations grown at USAMRIID were combined with the Dugway produced spores to constitute RMR 1029. IVINS said this mixing together of disparate combinations of Ames spore preparations was of no scientific concern because consistency between individual batches was not important - the objective was to amass one lot of 1,000 milliliters of Ames spores as quickly as possible.

IVINS reported that all seven batches of Ames anthrax sent to USAMRIID by Dugway Proving Ground were shipped in small plastic jars with a screw top which looked like urine specimen cups. IVINS explained that each batch received was taken out of the screw top jar and resuspended in a flask overnight. According to IVINS, the first six batches received from Dugway Proving Ground were resuspended and then Renografin® or RenoCal® purified, after which they were combined together with USAMRIID-made spores to constitute RMR 1029. The seventh batch of liquid Ames spores received from Dugway Proving Ground was also intended to become part of RMR 1029. However, IVINS advised that when he received the seventh batch from Dugway Proving Ground, he observed that it was "dirty," "clumpy," and contained too much "vegetative cell debris." In addition, the spores were not refractile (an indication they were not viable). IVINS believes he made one or two attempts to purify this seventh batch through resuspension, centrifugation, and by using Renografin® or RenoCal®. These purification efforts did

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not adequately improve the quality of the seventh batch, so IVINS set it aside for autoclaving (i.e., steam sterilization which would destroy the spores). IVINS clarified that he does not actually remember placing the seventh batch in the autoclave. IVINS explained that his usual practice in autoclaving materials was to place the item or items in a dishpan and insert the dishpan into the autoclave and shut the door. If the autoclave was fully loaded with other items to be autoclaved, he would run the autoclave immediately. However, if the autoclave was not fully loaded after placing his items in it, the items would sit within the autoclave until enough items were added by other persons to fully load the autoclave. The person who added enough items to fill the autoclave would turn on the autoclave.

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IVINS could not specifically recall whether he telephoned [redacted] to advise [redacted] that the seventh batch of spores was bad. IVINS believes, however, that he did make such a call. IVINS advised that the quality of the seventh batch became less of a concern because he determined that with the six preceding Dugway batches plus what he added from USAMRIID's own stocks, he had the necessary 1,000 milliliters of concentrated spores even without Dugway's seventh batch. Accordingly, IVINS advised that Dugway was not asked to replace the bad seventh batch of spores.

When questioned about the reasonableness of autoclaving a batch of spores that ostensibly cost a lot of money to produce, IVINS explained that USAMRIID's contract with Dugway required Dugway to produce 1,000 milliliters of "useable" Ames anthrax spores. Dugway was not paid on a "per batch" basis, but was compensated based on the entirety of the project. Accordingly, USAMRIID was not "charged" for the seventh batch of spores that IVINS autoclaved. Even if USAMRIID had agreed to pay Dugway on a per batch basis, the seventh patch of spores was "not useable" and therefore did not conform to the terms of the contract and would not have been paid for by USAMRIID.

IVINS stated that this seventh batch of Dugway Ames spores was the only one of the seven lots that had to be destroyed due to poor quality; the other six lots were all combined to constitute RMR 1029. IVINS noted that at least one of the other six batches was also of poor quality, however, IVINS was able to "clean it up" using the RenoCal®/Renografin® purification procedure. He acknowledged that batches of spores produced by

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Dugway for USAMRIID after the mailings included some batches which were of very poor quality and also had to be discarded.

Spore Viability of RMR 1029

ADMINISTRATIVE: IVINS was questioned concerning the viability of RMR 1029 after the FBI returned RMR 1029 to IVINS due to a conflict between his earlier representations that its concentration was 10^{10} colony forming units (cfu) per milliliter (ml) and the Navy Medical Research Center's (NMRC's) evaluation that the concentration was 10^9 cfu/ml.

IVINS stated that the concentration of RMR 1029 was either 2.4×10^{10} cfu/ml or 2.5×10^{10} cfu/ml when he checked it after it was returned by the FBI. IVINS advised that he has never observed RMR 1029 drop below approximately 3.5×10^{10} cfu/ml during its existence. He also said he did not add any more spores to the RMR 1029 material after the FBI returned it to him. When asked whether it would have been possible for someone to take some of the anthrax slurry out of the RMR 1029 flask and replace it with water without detection, he responded in the affirmative.

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IVINS could offer no explanation other than "technical error" for the discrepancy between his and NMRC's conflicting measurements of the concentration of RMR 1029. When asked to opine as to what may have caused such a drop in viability, IVINS said he did not know. IVINS was highly skeptical of the FBI's claim that the concentration of RMR 1029 was really 10^9 . He explained that after the FBI gave RMR 1029 back to him, he used 25 ml for an animal challenge conducted by USAMRIID researcher [redacted]. IVINS said he would not have been able to perform this "animal spray" if the concentration of RMR 1029 had been 10^9 because this concentration would have been too low to challenge the vaccine.

IVINS offered that the FBI could access his electronic notebook in "File Maker Pro" on the USAMRIID server to verify his findings of the concentration of RMR 1029 as used in [redacted] animal challenge. IVINS suggested the interviewing Agents contact [redacted] at USAMRIID to gain access to this electronic notebook. IVINS agreed to provide a copy of the RMR 1029 record previously shown to SSA [redacted] on which he had entered the concentrations of RMR 1029 on various dates during its existence. He also agreed to allow SA [redacted] to accompany him into suite B3 immediately after the interview to review his procedures for determining the concentration, secure the remainder of RMR 1029, and secure the

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suspected [] sample submitted by [] This suite entry was arranged by SSA [] at the end of this interview and is documented separately by SA []

Ames Anthrax Spore Production at USAMRIID

IVINS characterized the quality of anthrax spores produced by he and his colleagues as follows: BRUCE IVINS and [] made "good spores." [] made "very, very good spores" and, according to IVINS, was a "master" spore maker. [] produced "okay" spores. IVINS advised that he and [] made anthrax spores at USAMRIID until [] arrived at USAMRIID at which time IVINS stopped making spores. Thereafter, spores were produced by [] When [] left USAMRIID, IVINS began making spores again. IVINS related that most spore production runs at USAMRIID produced spores in concentrations ranging from 5×10^8 cfu/ml to 5×10^{10} cfu/ml. Spore production runs were not always documented by the Bacteriology Division personnel.

IVINS explained that if spores from a particular production run "looked bad," the spores "got pitched" (i.e., autoclaved), however, no logs or records were kept of what or how much anthrax spore material was autoclaved. When asked how often bad spore production runs occurred, IVINS responded that it depended on the strain and who produced the spores. IVINS estimated that on average somewhere between every fifth and every tenth batch of spores had to be discarded due to inadequate quality. IVINS said that each person producing spores was authorized to unilaterally decide whether to keep or destroy a particular spore production lot. It was not necessary to get authorization to destroy a bad batch of spores. Spores were destroyed by autoclaving.

IVINS advised that prior to the fall 2001 anthrax attacks, suite B3 contained an extensive number of tubes and flasks containing liquid anthrax spores. When asked how many such containers were stored in the room, he advised there were "hundreds of containers of all sizes, but probably not thousands." There was no common labeling scheme or protocol for these containers - they were labeled by the individual researchers to whom they belonged. Each researcher had the discretion to label the containers as he/she saw fit. Many of the containers which held Ames anthrax spores were labeled "Ames." As an example, IVINS noted that the flask containing RMR 1029 was labeled as "Ames." There was no inventory of the flasks and tubes. The walk-in refrigerator in B3

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contained shelves which were always filled with flasks and tubes of spores.

RMR 1029 and Phenol

IVINS advised that phenol is typically added to liquid spore solutions in a concentration of one percent. Phenol acts as a preservative. IVINS related that phenol is not harmful to the spores at this concentration but does inhibit the growth of other bacteria in the liquid spore suspension. IVINS was unsure whether phenol is an "alcohol," but explained that it does have a "benzene ring." Phenol is not a dehydrating agent, according to IVINS.

USAMRIID Assistance to Bioport

IVINS advised that the commanding General of USAMRIID told USAMRIID employees that he would fully support efforts to assist Bioport in overcoming its anthrax vaccine production problems. IVINS said he and others at USAMRIID were frustrated about being pulled away from their regular duties at USAMRIID and sent to Bioport to help with the technical aspects of Bioport's vaccine production program.

When asked whether he knew anyone who may have benefitted financially from Bioport's development of an effective anthrax vaccine, IVINS said he thought [redacted] and may have benefitted. IVINS did not know of anyone at USAMRIID who had a financial interest in Bioport.

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Possible Beneficiaries of the Anthrax Attacks

When asked whether anyone he knew benefitted from the fall 2001 anthrax attacks, IVINS said he could think of only [redacted]

[redacted] IVINS advised that [redacted] saw a rise in stature and attention following the attacks. IVINS noted that after the anthrax attacks, [redacted] was "really into this thing," meaning the bio-forensic initiatives used to characterize the anthrax powders used in the attacks.

IVINS also believed that USAMRIID scientist [redacted] after the attacks, however, IVINS quickly added that he does not believe [redacted] had anything to do with the anthrax attacks.

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When asked whether he himself had benefitted in any way from the attacks, IVINS advised that as a result of his and other USAMRIID researchers' work, the second generation RPA vaccine was perfected and a company called "Vaxgen" was awarded a contract with the U.S. Government to mass produce it. IVINS advised that a component of the vaccine efficacy testing incorporated a genotype of anthrax known as the "Congo Red mutant." The Congo Red mutant was developed by [REDACTED]. The principal feature of the Congo Red mutant was that it would not sporulate and thus could be used safely for both vaccine production and vaccine testing. This non-sporulating Congo Red mutant was patented by [REDACTED]. IVINS could not recall, however, whether it was patented before or after the anthrax attacks. IVINS and several other researchers were also involved in the patenting of the RPA vaccine. Whenever the two patents were included as part of an awarded contract, royalties were received. IVINS said that as a result of their work on the patented RPA vaccine, the following USAMRIID employees received a "royalty" when Vaxgen was awarded the contract: IVINS, [REDACTED]. [REDACTED] IVINS advised that his "royalty" check was for \$6,000. IVINS said he received this money recently and definitely after the attacks. IVINS clarified that he had no contractual relationship or business arrangement with Vaxgen. IVINS claimed that it was "someone way up above" in the Department of Defense who decided that IVINS and the others would receive a royalty. The royalty from the Vaxgen contract was not something IVINS or any of the other recipients negotiated directly with Vaxgen. IVINS shared his royalty payment with [REDACTED].

SSA [REDACTED] advised IVINS that there are e-mails in his archive which pertain to the patents mentioned above and which indicate that [REDACTED]. IVINS said that [REDACTED].

[REDACTED]

[REDACTED] IVINS said he had forgotten about the [REDACTED].

[REDACTED]

Enhancement of USAMRIID's Role as a Bio-Forensics Lab

IVINS advised he was aware of an emphasis placed by USAMRIID command on expanding USAMRIID's role as a bioforensic analysis center prior to the anthrax attacks. IVINS related that he did not concern himself with the details of this because it did

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not interest him. IVINS explained that he enjoys developing vaccines and therapeutic applications, not bio-forensics which he characterized as "black-box" operations.

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IVINS did recall that during Operation Noble Eagle, USAMRIID was asked by the Ft. Detrick Commander to analyze some incoming samples acquired by the military. According to IVINS, [redacted] advocated that none of the samples should go to the Bacteriology Division where IVINS works because [redacted] was afraid the Bacteriology Division scientists would "mess up something."

[redacted] Departure from USAMRIID

IVINS advised that when [redacted] left the employ of USAMRIID, it was because [redacted] IVINS observed that [redacted] departure was "pleasant" and seemed to be a good career move for [redacted] IVINS did not perceive [redacted] to be bitter when [redacted] left, and he was not upset with [redacted] for leaving. IVINS said [redacted] and that his [redacted]

BRUCE IVINS' E-mails

ADMINISTRATIVE: IVINS was next questioned by the interviewing Agents concerning e-mails he had exchanged with [redacted]

IVINS was aware that many of these e-mails reveal aspects of his personal life and mental health at the time, including an acknowledgment by him that he was seeing a psychologist and had been diagnosed with "paranoid personality disorder." IVINS offered that at the time some of these e-mails were written he was taking the antidepressant prescription medication Celexa® (citalopram hydrobromide). IVINS said he is better now and no longer takes Celexa®. IVINS related that he internalizes his negative emotions and, as a result, suffers from ulcers and irritable bowel syndrome. When asked whether his psychological condition had ever caused him to do anything which surprised him, IVINS responded in the negative. IVINS offered that he does not "act out" and has never hit his wife.

IVINS also volunteered that [redacted] and he experienced many difficulties with them during these years. IVINS said that [redacted]

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[redacted]
[redacted] During this time, "home was not good," he said. IVINS advised that prior to the anthrax attacks, he sometimes went to the USARMIID facility "to escape" the stresses of his family.

On these occasions, which included some weekends, IVINS said he would enter the hot suites, especially suite B3 in Building 1425, where he would just sit in the suite and think. IVINS explained that he went into the hot suites rather than his administrative office on the cold side because there was one particular security guard at the facility, [redacted] who was prone to entering his office unannounced and engaging IVINS in conversation. IVINS advised that he entered the hot suites to think because it was more private, and the guard who bothered him could not enter the hot side of the facility.

IVINS related that when he entered the hot suites on the weekend, other researchers were sometimes working in the area. However, because of his own problems, he paid no attention to them or to the work they were performing. He emphasized that his respites occurred in a pre-attack environment before suspicions were heightened. Accordingly, IVINS said he was not concerned with which particular fermenter may have been running or what was growing in a particular laboratory. IVINS noted, however, that he never saw anyone in suite B-3 who should not have been there.

When questioned about the delivery of a bottle of wine and Kahlua which were left anonymously on the doorstep of [redacted] in September 2002, IVINS immediately admitted that he is the person who secretly left the basket. He explained that he had driven from Frederick, Maryland to [redacted] New York one day when his wife was not at home. IVINS acknowledged that the round trip was a drive of approximately 10-11 hours. IVINS said he went to this effort because [redacted]

[redacted]
"this was a surprise for [redacted] IVINS agreed with suggestions by the interviewing Agents that this was a long way to drive just to leave [redacted] favorite wine and Kahlua. He characterized this venture as a "killer trip" because he had two herniated disks in his spinal column which made long drives in the car uncomfortable. IVINS said this is the only time he ever did this. He noted, however, that he has sent [redacted] lots of packages containing [redacted] SSA [redacted] asked IVINS if he had ever taken such a trip to Princeton, New

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Jersey, and he replied, "No. I was not involved" (referring to the mailings).

ADMINISTRATIVE: Because IVINS' e-mails indicated that he had mailed some packages to [redacted] anonymously and from various locations, he was also questioned regarding these mailings.

IVINS admitted that he once drove to Gaithersburg, Maryland, and sent a package to [redacted] so [redacted] would not immediately perceive from the postmark that it was a package from him (which would have been indicated by a Frederick, Maryland postmark). IVINS similarly advised that he went to this effort to add to the "surprise factor" - he did not want [redacted] to realize the package was from him until [redacted] opened it.

When asked whether he had ever engaged in any similar driving activity, IVINS related that in the late 1990s he occasionally drove roundtrip from Frederick, Maryland to Flintstone, Maryland where some friends lived. He did not visit his friends on these trips, describing the journeys as just "mindless drives." IVINS equated these drives with the way some people go for a long walk.

IVINS said he never bought or used any pre-franked (postage paid) envelopes prior to the attacks and never sent any to [redacted] in the care packages.

IVINS' Connections with Princeton University

IVINS advised that his father graduated from Princeton University in 1928. IVINS traveled through the town of Princeton with his parents, circa 1956, on a family vacation which included a tour of historic sites in Philadelphia. During this trip, his family did not take a tour of Princeton University. IVINS said that other than this trip, he has never been to Princeton, New Jersey or taken a tour of the university. IVINS has never applied to attend Princeton University, stating that he applied to only two colleges: the University of Cincinnati (which he attended) and Ohio State University. The only other nexus to Princeton University he could think of involved his family going to see a troupe of entertainers called the "Princeton Triangle Club," when the group toured Cincinnati where he grew up.

When asked to opine as to why the anthrax mailer may have chosen Princeton, New Jersey as the site for placing the anthrax

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letters into the mail stream, IVINS speculated that the perpetrator may be a Princeton University professor.

IVINS identified USAMRIID scientist [redacted] as the only other USAMRIID employee he knew of with any connections to Princeton, New Jersey. IVINS advised that [redacted]
[redacted]

IVINS' Acquisition of Antibiotics from his Brother

IVINS confirmed that [redacted]
[redacted] prior to the anthrax attacks. IVINS said he never obtained any antibiotics from [redacted]. Moreover, IVINS reported that no one ever asked him for antibiotic tablets or pills prior to or after the anthrax attacks. He noted, however, that other USAMRIID researchers had asked him for liquid antibiotics to use in their research.

IVINS' Hiking

IVINS advised that in his younger days he was a hiker, but not now. The herniated disks in IVINS' back now preclude him from hiking. IVINS said he has never hiked in Gambrill State Park, either before or after the anthrax mailings. He reported that he did drive through Gambrill State Park on one occasion several years ago. He was also aware that a young woman had committed suicide there in the past.

[redacted]

IVINS advised that when [redacted] was working at USAMRIID in 2001, IVINS never saw [redacted] in suite [redacted]. IVINS never talked with [redacted] about the RenoCal®/Renografin® anthrax purification procedure or the production of RMR 1029. To IVINS' knowledge, [redacted] never entered any containment suite at USAMRIID prior to the mailings.

OLIVER "PERRY" MIKESELL'S [redacted]

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ADMINISTRATIVE: IVINS was informed by the interviewing Agents that PERRY MIKESELL's [redacted]
[redacted]
[redacted] IVINS was queried concerning his knowledge on this point.

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IVINS advised that he got along well with PERRY MIKESELL and was not aware [REDACTED] employee of USAMRIID. IVINS could offer no explanation for [REDACTED]

Destruction/Discard of Anthrax in Suites B3 and B4 of USAMRIID

IVINS advised that sometime after the anthrax attacks, he cleaned out and destroyed a lot of anthrax stocks from suites [REDACTED] and [REDACTED] because they were no longer to be used at USAMRIID. IVINS noted, however, that he saved any isolates or stocks in use which he thought the FBI might be interested in.

IVINS' USAMRIID OFFICE COMPUTER

ADMINISTRATIVE: An e-mail in IVINS' archive claimed that immediately after the September 11, 2001 attacks, USAMRIID Command had instructed all USAMRIID employees to backup their computer data and to take the copy home. This was purportedly a precautionary measure in the event that USAMRIID was targeted for a second wave attack in the aftermath of 9/11. IVINS was asked whether he backed up his computer and took any of the backup material to his home.

IVINS did not recall the e-mail or the request. IVINS advised that he uses floppy disks and zip drives as portable storage media for his office computer and that the FBI had copied all of it. IVINS said he did not remember ever backing anything up on storage media to take home. IVINS related that to the best of his knowledge, he does not have any work-related material at his home, other than a presentation he was to give at a technical conference. IVINS offered to allow the FBI to make a copy of his home computer hard drive and agreed to look for any work-related electronic media at home. The mirroring of IVINS' home hard drive was arranged toward the end of the interview. The consent search of his home computer and a re-interview of IVINS during the imaging of the hard drive are memorialized in separate FD 302s.

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IVINS telephonically contacted SSA [REDACTED] within an hour after the first interview on March 31, 2005. He advised that he had found the copy of his RMR record on which he had documented the concentrations of RMR 1029 over time and had also found his record of [REDACTED]

He explained that one of the samples in the first submission was referred to as 1997 Dugway spores and that the 1997 Dugway spores

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and RMR 1029 are one and the same. He emphatically stated that he had indeed provided RMR 1029 to the FBI in the first submission in 2002. He agreed to provide these documents to SA [redacted] when SA [redacted] arrived at IVINS' office on the same day to obtain IVINS' e-mails archived on the server.

Additionally, IVINS was asked if he would review a list of individuals whom the Agents believed to have had access to suite B3/B4 and to IVINS' Ames stocks in order to assist in providing the names of any other individuals who might have accessed that area prior to the period covered by the USAMRIID key card records. He agreed to do so.